



Personal development on youth expeditions: a literature review and thematic analysis

Tim Stott, Pete Allison, Johannes Felter & Simon Beames

To cite this article: Tim Stott, Pete Allison, Johannes Felter & Simon Beames (2015) Personal development on youth expeditions: a literature review and thematic analysis, *Leisure Studies*, 34:2, 197-229, DOI: [10.1080/02614367.2013.841744](https://doi.org/10.1080/02614367.2013.841744)

To link to this article: <https://doi.org/10.1080/02614367.2013.841744>



Published online: 27 Sep 2013.



Submit your article to this journal [↗](#)



Article views: 3876



View related articles [↗](#)



View Crossmark data [↗](#)



Citing articles: 3 View citing articles [↗](#)

Personal development on youth expeditions: a literature review and thematic analysis

Tim Stott^{a*}, Pete Allison^b, Johannes Felter^a and Simon Beames^c

^aFaculty of Education, Community & Leisure, Liverpool John Moores University, Barkhill Road, Liverpool L17 6BD, UK; ^bThe Institute for Sport, Physical Education and Health Sciences at The Moray House School of Education, The University of Edinburgh, Edinburgh EH8 8AQ, UK; ^cThe Institute for Education, Teaching and Leadership, The Moray House School of Education, The University of Edinburgh, Edinburgh EH8 8AQ, UK

(Received 15 June 2012; final version received 1 June 2013)

Youth expeditions are associated with a range of benefits for participants. More young people are participating in overseas expeditions than ever before as vacation and gap year choices are diversified by a rising number of expedition providers. To date, there has been no systematic research effort to draw together and evaluate the evidence that underpins the benefits or, otherwise, for youths participating in overseas expeditions. This paper reviews empirical and philosophical literature which has been published in a range of journals and themes emerging are placed into a personal growth model. This review (or mapping exercise) focused on post-1990 literature and found 35 key publications which met the criteria: youth expedition; duration exceeding 14 days, self-propelled, and based overseas or out-of-state. The 35 publications (UK 26; USA 4; Australia 3; Japan 1; South Africa 1) were subjected to a thematic analysis using Greenaway's 'Four Arrows' model of personal growth. Outcomes associated with overseas youth expedition participation included (1) upward personal growth (realising potential) including increased confidence; physical and social resilience; self-reliance and ability to overcome challenges, (2) outward personal growth (learning about & relating to others), (3) inward personal growth (learning about self) and (4) downward personal growth (learning about environment). The processes that were valued in overseas expeditions and which, with some caution, may be linked with some of the aforementioned outcomes include: genuine independence; group isolation and self-sufficiency; person-centred leadership; positive responses to stress and physically demanding activity. Suggestions for areas for further meaningful research are offered.

Keywords: expedition; literature review; thematic analysis; personal development

Background

The literature on personal and social benefits of expeditions for young people is disparate, both in methods and in location, with publications appearing in a range of different journals. This is to be expected given the interdisciplinary nature of this emerging field. Unfortunately, this interdisciplinary strength is also a weakness in that much of the literature is inaccessible outside of academia (raising challenges for knowledge exchange and impact) and is non-cumulative or repetitive. This paper

*Corresponding author. Email: t.a.stott@ljmu.ac.uk

aims to ‘map out’ the current territory in an attempt to establish themes from the extant literature. However, before embarking on the details of the study, we offer a brief summary of the history of youth expeditions and some research in outdoor adventure education which has been used to underpin the educational value of challenging experiences beyond formal schooling.

Outdoor adventure education is a sector of educational provision that has provided challenging experiences beyond formal schooling with the specific aim of eliciting personal development in young people for over one hundred years. It has a rich history in the UK (Allison, Stott, Felter, & Beames, 2011, Chap. 10; Cook, 1999; Freeman, 2011; Loynes, 1999a, 1999b) and the idea of British youth going overseas in search of adventure dates back to 1932, when Surgeon Commander Murray Levick formed the Public Schools Exploring Society, which later became The British Schools Exploring Society (BSES Expeditions), and recently renamed British Exploring in 2012. Young explorers (aged 16–20) participated in field projects in remote regions of the world with the aim of self-discovery. For many years, they remained the sole organisation entirely dedicated to taking young people abroad to participate in adventurous activities, with the majority of their participants coming from public schools (Grey, 1984).

Despite this ‘development-through-challenge’ approach being widespread in practice, with a substantial body of psychological research underpinning the link between challenge and resilience (e.g. Bonanno, 2004), it is largely uncontested as a foundation for residential experiences and expeditions. In the UK, there is a centuries-old tradition of adventure and exploration, which some would argue has laid the foundation for the modern concept of outdoor education (Allison & Higgins, 2002; Freeman, 2011; Loynes, 1999b; Williams, Higgins, Humberstone, & Loynes, 1998). This sector of outdoor adventure education has grown significantly in the past half century (Hopkins & Putnam, 1993; Nicol, 2002). Since the 1990s, several studies have attempted to understand the impact of outdoor experiences on young people and, whilst being cautious of over-generalisation, positive claims can be found (Hattie, Marsh, Neill, & Richards, 1997; Rickinson et al., 2004). Most research undertaken can be characterised as striving towards an experimental or quasi-experimental design which might, arguably, reflect the current political and financial climate in which the work has been undertaken (Howe, 2005). However, the outcome-focussed nature of such research has received some criticism (e.g. Allison, 2007, 2009; Allison & Pomeroy, 2000; Thomas, Potter, & Allison, 2009). Much adventure-based education is founded on the premise that humans must encounter their physical and/or psychological limits in order to enhance their capacity to successfully address the challenges of everyday life (see Csikszentmihalyi & Csikszentmihalyi, 1990; Ewert, 1989; Hunt, 1990; Miles & Priest, 1999; Priest, 1990; Priest & Gass, 1997). Some empirical research has indicated that controlled exposure to challenge can enhance participants’ psychological resilience (Neill & Dias, 2001) but Davis–Berman and Berman (2002) claimed that outdoor leaders should reconsider the common practice of pushing participants, particularly troubled youth, out of comfort zones by deliberately increasing perceived risk and instead suggested that the greatest amount of change and growth comes from a place of comfort, emotional security and acceptance. This tension between a ‘pushing comfort zones’ approach and ‘supportive learning environments is further explored by Allison and Wurdinger (2005) and Palethorpe and Wilson (2011).

The period from the mid-1970s to the mid-1980s saw the British overseas youth expedition transform from a product exclusively for the socio-economically privileged into one catering to a 'much larger range of children of varying social backgrounds and academic abilities' (Grey, 1984, p. 17). Early examples of these programmes include Kennedy's (1992) 10-week overland expeditions to the Sahara desert with unselected inner city youth from Liverpool where evidence was presented that the expeditions had a major influence on the social and moral development of the members. The 1980s also marked the period when expedition research was born (Grey, 1984; Kennedy, 1992).

The upsurge in expedition providers and the numbers of young people participating in overseas expeditions led to inevitable questions about safety, quality, ethics, and cultural and environmental impacts (Allison, 2001; Allison & Beames, 2010; Allison & Higgins, 2002; Allison & Telford, 2005; Smith, 2008). Following the UK Lyme Bay tragedy in 1993, the Adventure Activity Licencing Authority, which later became the Adventure Activity Licencing Service, was formed in the UK to oversee safety in commercial outdoor and adventure providers undertaken in the UK with young people. In 1999, the Expedition Advisory Centre of the Royal Geographical Society hosted a conference on 'Expedition and Fieldwork Safeguarding Opportunities for Young People' (EAC/RGS, 1999), and by 2007, British Standard 8848, a specification for the provision of visits, fieldwork, expeditions and adventurous activities outside the UK (BSI, 2007) was developed for voluntary use by expedition providers and all organisations arranging overseas adventures, fieldwork, courses, and so on. All these developments were essential to underpin the growth of youth expeditions and, thus, establish their contribution to the education and personal development of their participants. They also indicate a change in the sector which provided a locus for providers to 'come together' (literally and metaphorically) as these standards (especially BS8848) are those which an organisation will be 'measured against' in a court of law in the case of accidents and fatalities.

Jones (2004) estimated that 250,000–350,000 Britons between 16 and 25 years old were taking a gap year annually and that more organisations than ever before were providing expeditions for young people as school vacation or gap year experience. In 2004, the Royal Geographical Society published an Expedition Handbook (Winsor, 2004), and later, Rowe (2008) reported that 'the gap year market is valued at £2.2 billion in the UK and globally at £5 billion. It's one of the fastest growing travel sectors of the twenty-first century, and the prediction is for the global gap year market to grow to £11 billion by 2010' (p. 47). The Geography Outdoors (formerly Expedition Advisory Centre) Fieldwork and Expeditions section of the Royal Geographical Society list over 200 organisations which are recruiting expedition members (Geography Outdoors, 2012). They also offer young people a Gap Year Planning Toolkit (<http://www.rgs.org/OurWork/Fieldwork+and+Expeditions/Joining+an+expedition/Gap+year+Archive.htm>, accessed 21-11-12). Over the past decade, there has been an increasing emphasis on the value of enrichment activities outside the classroom, with the UK Government developing the Manifesto for Learning Outside the Classroom (2006) and the Scottish Government's Curriculum for Excellence through Outdoor Learning (2010). Whilst there is some mention of overseas and expeditionary experiences in these documents, there is little, if any, evidence of commitment to this aspect of outdoor learning.

One motivation for undertaking this review can be sourced back to 2008 when the ESRC funded a knowledge exchange event at The University of Edinburgh

called ‘360 degrees on overseas youth expeditions’. The event (organised by Allison) drew together those interested in expeditions from policy, research and practice. A primary theme that emerged from the event was a frustration at the lack of connection between the three areas and, in particular, criticism of: (a) research in the area being difficult to access by those outside of academic institutions; (b) the wide range of outlets for such publications often making them difficult to find; (c) the repetitive nature of a great deal of expeditionary research and; (d) the lack of connections to practice which led to use of the phrase ‘practice informed research’. What we have undertaken so far might be conceptualised as an initial ‘mapping exercise’ which indicates the current knowledge with regard to personal development and overseas youth expeditions and in doing so we have identified themes and, by inference, gaps.

Given the above mentioned increase in overseas expeditions, associated government policy, and relevant empirical research, the aims of this study were:

- to review the body of empirical and philosophical research that has been conducted on overseas youth expeditions then summarise the current literature with reference to how expeditions and spending time in wilderness areas impact young people’s learning, values, attitudes and future behaviour,
- to assess the extent to which Greenaway’s (1998) ‘four arrows’ personal growth model can be used to categorise the literature found.

Methods

Whilst neither a pure systematic review (e.g. Khalid, Kunz, Kleijnen, & Antes, 2003) nor a meta-analysis (e.g. Hattie et al., 1997), this literature review focussed its search on post-1990 literature concerning youth development expeditions, making the assumption that it would be available electronically, and therefore, the searches were confined to using electronic databases only. We acknowledge, therefore, that non-electronic or pre-1990 literature may have been missed in our searches. In all cases, abstracts or summaries of works were available, and full e-copies of publications were then traced. The following terms were used to conduct the searches: expedition, wilderness, youth development, science, adventure, fieldwork and community development. The process was conducted in four phases. In Phase 1, over 1500 hits were obtained from Google Scholar, journal searches, and from private collections kept by the authors. Since the initial search brought up a large number of hits, these were then filtered according to further criteria: the duration of the expedition must have exceeded 14 days, it must have been self-propelled and was based overseas or out-of-state (in the cases of Australia & North America). In Phase 2, the reduced number of selected journals, articles and books was read and relevant items from bibliographies selected. In Phase 3, items from Phase 2 were read in more detail and summarised. In Phase 4, once we were satisfied that no new items were being found through repeated searches, the database was narrowed down to 35 items, from which the subsequent thematic analysis was conducted.

Thematic summary

Greenaway (1998) adapts a model originally developed by Giges and Rosenfeld (1976, Chap. 3), which he terms the ‘four arrows’ model. As Greenway notes,

‘personal growth can be viewed as making new connections in any of several directions’ (p. 25). Accordingly, the four arrows model represents the ways in which a person may develop during a given educational experience:

- *upward* to achieve one’s full potential;
- *outward* to make contact and encounter others;
- *inward* to increase our awareness of who we are, and what we want, need, sense, feel, think, and do;
- *and downward* to touch earth, to be grounded, and to connect (Greenaway, 1998, p. 25).

Greenaway argues that this model lends structure and definition to the typically amorphous term ‘personal development’. He claims that the model gives educators concrete goals to work towards, and as such, it is a natural fit with youth expedition planning (1998). We know that the outcomes from expeditions are not generalisable, but rather highly individual (Kennedy, 1992; Rea, 2006), and so, we believe that this model provides us with a way of organising those outcomes into a useful structure.

The 35 key publications matching the criteria were therefore assembled (see Tables 1a and 1b) and the key outcomes (and, where identified, processes) were added to give an overall summary matrix of what the key literature had identified in relation to outcomes of, and processes within, overseas expeditions. The final column of Tables 1a and b contains notes and comments on the methodological approaches of each of the studies, which is intended to give the reader some insights into the range of approaches adopted. We now discuss in greater detail first the outcomes (upward, outward, inward, downward) based on Greenaway’s (1998) adapted model, then go on to discuss the processes and finally draw together our key conclusions and suggestions for further research.

Overseas youth expedition outcomes

Upward personal growth (realising potential)

Several researchers have identified that participating in overseas youth expeditions appears to be associated with an increase in personal confidence, physical and social resilience and self-reliance (or ability to overcome challenges). According to Greenaway’s (1998) model, these qualities fall into the ‘upward’ (realising potential) category, and the sources of these claims are summarised in Table 2.

An increase in personal confidence is perhaps the best-known outcome of youth expeditions, and the one which may spring most readily to mind for participants, parents and providers. Accordingly, it is one of the most widely discussed outcomes in the existing literature. This outcome is described by Pike and Beames (2007), with one participant stating, ‘I think other people will possibly look at me differently ... it says something about you, that you have a certain character or personality’ (p. 150). The expedition experience can be viewed as a series of freely chosen hardships, and it is overcoming these hardships that, arguably, may produce an increase in confidence. Pike and Beames note that ‘[m]any participants [believed] that coping with the challenges they felt would be offered by Raleigh would enable them to present a more confident self in the future’ (p. 151).

Table 1a. Literature summary of key findings – Empirical studies.

		Key findings (classified after Greenaway, 1998)			
Author (s)	Date	Title	Outward: learning about others (sociability)	Inward: learning about self (emotion/reflection) environment	Comments/methodological notes/processes including expedition(s) on which the research was undertaken (if possible to ascertain)
Allison	1998	Greenland: more questions than answers	Upward: realising potential (confidence/physical & social resilience/self-reliance & overcoming challenges)	Connectedness to others	Observations and interviews on participants on W. Greenland expedition
Allison	2000	Research from the ground up – post-expedition adjustment	Changed perspectives in education/career	Connectedness to self values, self, life, career, friendships & relationships; Connectedness to self	Observations and interviews on participants on W. Greenland expedition
Allison	2005	Post-expedition adjustment – what empirical data suggest?	Connectedness to others	Reflection on values, self, life, career, friendships & relationships; connectedness to self	19 young people who took part in a Greenland expedition invited to write about their experiences at 6, 12, 18 and 24 months post-return. Supplemented with interviews.

(Continued)

Table 1a. (Continued).

Key findings (classified after Greenaway, 1998)			
Author (s)	Date	Title	Key findings
Allison, Davis-Berman, & Berman	2011	Changes in latitude, changes in attitude: analysis of the effects of reverse culture shock – a study of students returning from youth expeditions	<p>Upward: realising potential (confidence/physical & social resilience/self-reliance & overcoming challenges)</p> <p>Outward: learning about others (sociability)</p> <p>Inward: learning about self (emotion/reflection)</p> <p>Downward: learning about environment</p> <p>Comments/methodological notes/processes including expedition(s) on which the research was undertaken (if possible to ascertain)</p>
Andrews	1999	The wilderness expedition as a rite of passage: meaning and process in experiential education	<p>Sense of isolation</p> <p>Reflection on values, self, life, career, friendships & relationships</p> <p>Sense of place</p> <p>Anthropological approach using interviews. Interested in 'personally transformative experiences taking place outside of the regular social structures'. (2–5 week expeditions, details not specified)</p>

(Continued)

Table 1a. (Continued).

		Key findings (classified after Greenaway, 1998)		
Author (s)	Date	Title	Outward: learning about others (sociability)	Inward: learning about self (emotion/reflection) environment
Ashby	1999	The educational role of expeditions	Upward: realising potential (confidence/physical & social resilience & self-reliance & overcoming challenges)	Downward: learning about environment
Beames	2003	Overseas youth expeditions in Humberstone, B et al. Ed. 'Whose journeys? The outdoors and adventure as social and cultural phenomena	Being challenged (mental 'stretch' and physical hard work); increased self-esteem; increased self-confidence; feeling a sense of achievement; ability to find work post-expedition	Helping people in greater need; Opportunities to make decisions; increased independence
			Interpersonal skills; being immersed in a foreign culture; working with a diverse group of people	Largely of a descriptive account of one expedition – reflects briefly on potential of expeditions for effecting personal change, citing Kennedy (1992). Thematic discussion based on participant interviews (what Beames calls hermeneutic /phenomenological/non-positivist).

(Continued)

Table 1a. (Continued).

		Key findings (classified after Greenaway, 1998)	
Author (s)	Date Title	Upward: realising potential (confidence/physical & social resilience/self-reliance & overcoming challenges)	Outward: learning about others (sociability)
Beames	2004a Overseas youth expeditions with Raleigh International: A rite of passage?	Separation from family/friends	Mixing with different people from different backgrounds
		Inward: learning about self (emotion/refection)	Downward: learning about environment
		Learning to adapt back to home/society (incorporation)	
			Comments/methodological notes/processes including expedition(s) on which the research was undertaken (if possible to ascertain)
			Anthropological approach: case study method to interview 14 British youths two months before leaving on expedition, three times on expedition and six months post-expedition. Thematic analysis to identify positive and negative indicators of van Gennep's (1960) three stage model of rites of passage: separation, transition and incorporation
Beames	2004b Critical elements of an expedition experience	Social environment in which participants are in virtually constant contact with other group members; diverse group of people	Data collection involved five rounds of interviews with 14 British participants over a one-year period, using categorical aggregation to determine five principal themes critical to the experience. Self-sufficient living arrangements; Physically demanding activity.

(Continued)

Table 1a. (Continued).

		Key findings (classified after Greenaway, 1998)		
Author (s)	Date	Title	Outward: learning about others (sociability)	Inward: learning about self (emotion/reflection) environment
Beames	2005	Expeditions and the social construction of the self	Upward: realising potential (confidence/physical & social resilience/self-reliance & overcoming challenges)	Comments/methodological notes/processes including expedition(s) on which the research was undertaken (if possible to ascertain)
			More willing to undertake challenges; Mental resilience; Increased facility for living and working with strangers	Greater understanding of themselves
Beames and Stott	2008	Raleigh International pilot study report	More comfortable with people from different cultures; more able to lead group projects; speak mind in group situations;	Appreciation of modern conveniences
			Clarified life direction/career aspirations; improved interaction with friends/family at home after; more aware of mental strengths/weaknesses; more resilient	Employs a theoretical framework based on the symbolic interactionist writing of Blumer (1969), Mead (1934) and Cooley (1962, 1964).
				5-point Likert scale questionnaire survey before and after 10-week expedition to Costa Rica (n = 42).

(Continued)

Table 1a. (Continued).

		Key findings (classified after Greenaway, 1998)		
Author (s)	Date	Title	Upward: realising potential (confidence/physical & social resilience/self-reliance & overcoming challenges)	Outward: learning about others (sociability)
Bobilya, Akey, and Mitchell	2009	Outcomes of a spiritually focussed wilderness orientation programme	Personal-emotional adjustment; Spiritual development	Inward: learning about self (emotion/reflection) environment Downward: learning about environment
Ewert and Yoshino	2011	A preliminary exploration of the influence of short-term adventure-based expeditions on levels of resilience	Perseverance; Equanimity; Self-Resilience; Self-reliance	Outward: learning about others (sociability)

Comments/methodological notes/processes including expedition(s) on which the research was undertaken (if possible to ascertain)

Small-scale study of 11 participants with control group of 9. Mixed-method design, 3 phases of data collection. Phase 1 analysis of a 3-5 page essay written one month after expedition. Phase 2 complete Student Adaptations to College Questionnaire (SACQ) one month after the start of the fall semester to students and the control group. Phase 3 – focus group interview. (Montreat College, North Carolina, 2006)

Small sample of students participating in a semester-long adventure expedition programme and answering pre- and post-course questionnaires based on a resilience scale . Physical expedition demands lead to increase in resilience

(Continued)

Table 1a. (Continued).

		Key findings (classified after Greenaway, 1998)		
Author (s)	Date	Title	Upward: realising potential (confidence/physical & social resilience/self-reliance & overcoming challenges)	Outward: learning about others (sociability)
Greffrath, Meyer, Strydom, and Ellis	2011	Centre-based and expedition-based (wilderness) adventure experiential learning regarding personal effectiveness: an explorative enquiry	Expedition-based wilderness programme translates into unique experiences of solitude, privacy and freedom of choice, spiritual upliftment, and restoration	Inward: learning about self (emotion/reflection) environment
Kennedy	1992	The expedition experience as a vehicle for change in the inner city	Small communities offer greater stability and let young people reassess their role in society through increased communal responsibility	Downward: learning about environment
			Increased relationship between efforts and rewards	
			The power of wild places: young people respect the power, violence and beauty of the outdoors yet rarely take notice of their natural surroundings at home	
			Observations of pupils from an inner city community comprehensive school which had to meet the problems resulting from multiple deprivation. An unusual aspect of its work has been its regular ten week expeditions to the Sahara for unselected groups of pupils and ex-pupils. No longer term follow-up. (Liverpool, late 1980s)	Comments/methodological notes/processes including expedition(s) on which the research was undertaken (if possible to ascertain)

(Continued)

Table 1a. (Continued).

Key findings (classified after Greenaway, 1998)		
Author (s)	Date	Title
Pike and Beames	2007	A critical interactionist analysis of 'Youth Development' expeditions
		Upward: realising potential (confidence/physical & social resilience/self-reliance & overcoming challenges)
		Outward: learning about others (sociability)
		Inward: learning about self (emotion/reflection)
		Downward: learning about environment
		Comments/methodological notes/processes including expedition(s) on which the research was undertaken (if possible to ascertain)
		Paper examines the experiences of a group of venturers who participated in a 10-week expedition to Ghana. Data were collected through a series of interviews and participant observation. The analysis of the participants' motives for engaging in the projects is informed by the interactional principles of Erving Goffman. Limitations of operating inside provider's safety net.

(Continued)

Table 1a. (Continued).

		Key findings (classified after Greenaway, 1998)		
Author (s)	Date	Title	Outward: learning about others (sociability)	Inward: learning about self (emotion/reflection) environment
Rea	2006	'It's not as if we've been teaching them ...' Reflective thinking in the outdoor classroom	Upward: realising potential (confidence/ physical & social resilience/self- reliance & overcoming challenges)	Downward: learning about environment
			Comments/methodological notes/processes including expedition(s) on which the research was undertaken (if possible to ascertain)	Research undertaken during a six-week mountaineering expedition to Iceland set out to investigate approaches to facilitating the reflective process in 20 participants aged between 14 and 18. A number of models were examined to help determine the educational philosophy underpinning the expedition. Research methods involved documentary searches, observations and semi- structured interviews. (School expedition, Iceland, 2003)

(Continued)

Table 1a. (Continued).

Key findings (classified after Greenaway, 1998)	
Author (s)	Date Title
Sheldon	2009 Rallying together: Confidence – A research study of Raleigh’s work with disadvantaged young people
	<p>Upward: realising potential (confidence/physical & social resilience/self-reliance & overcoming challenges)</p> <p>Outward: learning about others (sociability)</p> <p>Inward: learning about self (emotion/reflection)</p> <p>Downward: learning about environment</p> <p>Global awareness</p> <p>Comments/methodological notes/processes including expedition(s) on which the research was undertaken (if possible to ascertain)</p> <p>Research report on Raleigh expeditions focussing on the expedition experiences of young people from disadvantaged backgrounds. The report concentrates almost exclusively on the service learning/volunteering phase of Raleigh expeditions. Methodology includes basic statistical analysis of post-expedition questionnaires, mixed with interviews of participants from up to 25 years ago. Participants’ mixed views towards provider risk assessment; Self-sufficiency in a challenging environment; Group diversity. (Raleigh International, historical study)</p>

(Continued)

Table 1a. (Continued).

		Key findings (classified after Greenaway, 1998)		
Author (s)	Date	Title		
Stott and Hall	2003	Changes in aspects of student's self-reported personal, social & technical skills during a six-week wilderness expedition in arctic Greenland	<p>Upward: realising potential (confidence/physical & social resilience/self-reliance & overcoming challenges)</p> <p>Outward: learning about others (sociability)</p> <p>Inward: learning about self (emotion/reflection)</p> <p>Downward: learning about environment</p>	<p>Comments/methodological notes/processes including expedition(s) on which the research was undertaken (if possible to ascertain)</p> <p>5-point Likert scale questionnaire survey before and after 6-week expedition to NE Greenland ($n = 70$). (Stott & Hall, 2003)</p>
Takano	2010	A 20-year retrospective study of the impact of expeditions on Japanese participants	<p>Personal growth and exploration of potential; age when participating important. Challenging/new or unique experiences</p> <p>Living with diverse group of people; learning centred around diverse community</p> <p>Learning from difficult experiences</p> <p>The living and activity in the wild environment</p>	<p>Study examines the written responses of 67 Japanese expedition participants who took part in a British-organised overseas youth expedition 20–23 years ago, to investigate their perception of the influences of the experiences through a retrospective approach. (Raleigh International, various locations, 1984–1987)</p>

(Continued)

Table 1a. (Continued).

		Key findings (classified after Greenaway, 1998)		
Author (s)	Date	Title	Outward: learning about others (sociability)	Inward: learning about self (emotion/reflection) environment
			Upward: realising potential (confidence/ physical & social resilience/self- reliance & overcoming challenges)	Comments/methodological notes/processes including expedition(s) on which the research was undertaken (if possible to ascertain)
Watts et al.	1992	Expedition stress and personality change	Decreased cautiousness; increased ascendancy	An expedition to India organised by the BSES. The Gordon Personal Profile Inventory ($n = 76$) showed that the expedition was associated with increased ascendancy, emotional stability, sociability and responsibility and decreased cautiousness. Women tended to benefit more than men. Results suggest that the expedition was associated with positive personality changes.
Watts et al.	1993a	Personality change produced by expedition stress: A controlled study	Increased ascendancy	Extends the previous 1992 study by using a control group (i.e. friends of the same age and sex supplied by the expeditioners). Positive personality change is confined to expeditioners, and not found in controls.

(Continued)

Table 1a. (Continued).

Key findings (classified after Greenaway, 1998)			
Author (s)	Date	Title	
Watts et al.	1993b	Cognitive strategies in coping with expedition stress	<p>Upward: realising potential (confidence/ physical & social resilience/self-reliance & overcoming challenges)</p> <p>Outward: learning about others (sociability)</p> <p>Inward: learning about self (emotion/reflection)</p> <p>Downward: learning about environment</p> <p>Comments/methodological notes/processes including expedition(s) on which the research was undertaken (if possible to ascertain)</p> <p>Paper is based on same expedition as Watts et al. (1992) and draws similar conclusions but in some greater depth. Main themes emerging are the distinctions between social and physical stress, and the differences between male and female responses to these different stressors. Use of avoidance/resignation strategies in dealing with stress predicts less positive personality change.</p>

(Continued)

Table 1a. (Continued).

		Key findings (classified after Greenaway, 1998)	
Author (s)	Date	Title	
Watts et al.	1994	Personality and coping strategies on a stressful expedition	<p>Upward: realising potential (confidence/physical & social resilience/self-reliance & overcoming challenges)</p> <p>Outward: learning about others (sociability)</p> <p>Inward: learning about self (emotion/reflection) environment</p> <p>Downward: learning about environment</p> <p>Comments/methodological notes/processes including expedition(s) on which the research was undertaken (if possible to ascertain)</p> <p>Paper describes a study which is much more complex than the two previous undertaken by Watts. Results less definitive than previously, but do address difficulties of self-report questionnaires because leader observations are also included. Purpose was to supplement self-report questionnaire data with observers' ratings made by expedition leaders. Study does not reveal whether the changes, however, well substantiated, are temporary or permanent. It is upon this question that the educational value of expeditions depends.</p>

Table 1b. Literature Summary of Key Findings – Philosophical Studies.

AUTHOR (s)	Date	Title	Key findings (classified after Greenaway, 1998)		
			Upward: realising potential (confidence/physical & social resilience/self-reliance & overcoming challenges)	Outward: learning about others (sociability)	Downward: learning about environment possible to ascertain)
Allison and Beames	2010	The changing geographies of overseas expeditions			Comments/methodological notes/processes including expedition(s) on which the research was undertaken (if possible to ascertain)
Allison and Von Wald	2010	Exploring values and personal and social development: learning through expeditions		Reflection on values, self, life, career, friendships & relationships	Explores key ethical issues in expeditions
Brymer	2002	Exploring expedition research methodology: a personal reflection			Participants need to be allowed to make choices and mistakes
Cashel	1994	Group dynamics: implications for successful expeditions			Research methodologies for human dynamics and expeditions. Paper concerned solely with the theoretical and technical challenges to conducting valid research on expedition groups
Potter	1998	Human dimensions of expeditions: deeply rooted, branching out			Conscious address of group dynamics; conscious promotion of 'expedition behaviour'; Promote cooperative interdependence
					Conference paper which explores some of the aspects of building and fostering strong group dynamics to enhance excellent expedition behaviour and ultimately successful wilderness group experiences
					Heightened stress levels/lack of privacy; Be cognisant of conflict sources & stressors; Nurture an open environment for personal expression pre-trip

Table 2. Upward (realising potential) outcomes of overseas youth expeditions.

Upward (realising potential) (after Greenaway, 1998)
<i>Confidence</i>
Courage, gameness, integrity & composure (Pike & Beames, 2007)
Decreased cautiousness (Watts et al., 1992)
Confidence – ability to cope when bad things happen (Beames & Stott, 2008; Institute of Public Policy Research, 2009)
Increased ascendancy (Watts et al., 1993a, 1992, 1994)
Increased vigour (Watts et al., 1994)
More willing to undertake challenges (Beames, 2005)
Equanimity (Ewert & Yoshino, 2011)
Perseverance (Ewert & Yoshino, 2011)
Enthusiasm (Stott & Hall, 2003)
Personal growth and exploration of potential (Takano, 2010)
<i>Physical and social resilience</i>
Mental resilience (Beames, 2005)
Cope with constant cold (Stott & Hall, 2003)
Resilience (Ewert & Yoshino, 2011)
Increased facility for living and working with strangers (Beames, 2005)
Ability to live in crowded circumstances (Stott & Hall, 2003)
<i>SELF-reliance/overcoming challenges</i>
Self-reliance (Ewert & Yoshino, 2011)
Confidence and self-reliance (Ashby, 1999)
Ability to manage time efficiently (Stott & Hall, 2003)
Set priorities, achieve goals, solve problems efficiently (Stott & Hall, 2003)
Using the group as a compass for the future. (Allison et al., 2011)

There is a wide variety of terms used to describe an increase in confidence, and it is futile to attempt to distinguish between slightly different aspects of the same phenomenon. In essence, there is very good evidence that the expedition experience makes young people believe that they are better able to cope with adversity. This evidence is largely the result of self-report questionnaires. These have their problems, but confidence is one phenomenon of which they are a reliable measure (Stott & Hall, 2003; Watts, Webster, Morley, & Cohen, 1992).

After an increase in confidence, an increase in resilience is the most widely discussed expedition outcome. This outcome is essentially the ‘character building’ of which the first youth expedition programmes were so fond, though Brookes (2003a, 2003b) challenges the concept of character building through outdoor education. This aspect of the literature, however, remains contentious¹. In the modern literature, there is some debate about the extent to which the lessons learned on expedition transfer to more mundane situations in participants’ home lives. Nonetheless, it has been argued that short-term expedition experiences can produce a long-term personality change (Ewert & Yoshino, 2011; Takano, 2010). Similarly, recent work by Sayer (2011) suggests that change of understanding and world view typically takes time and does not happen ‘overnight’. Thus, one might reasonably speculate that expedition experiences might be a trigger for longer term changes but that such changes may not be immediately evident or, indeed, linked in a causal manner to such experiences. One aspect of resilience is the ability to tolerate physical hardship, such as constant cold, or physical challenges such as long treks or rationed food intakes. Another equally important aspect may be termed ‘social resilience’. Expeditions typically involve living and working with strangers, and

participants learn how to manage relationships with people that they would not normally associate with – either because of personality differences or due to other barriers such as social class, access to education or language (Takano, 2010). Moreover, there is evidence that expedition friendships often take on a meaningful quality that lies in stark contrast to those developed within normal social structures.

One study found a significant self-reported positive response to statements such as ‘I can deal with whatever comes in the future’ (Ewert & Yoshino, 2011). Others link this increase in self-reliance to the degree of the participants’ involvement in the practical operation of the expedition (Ashby, 1999; Kennedy, 1992). Stott and Hall (2003) concentrated their enquiry on practical problem-solving skills and found significant increases in participants’ self-reported ability to set and achieve goals, manage time and solve problems efficiently.

Overall, there is reasonable evidence to support the claim that expeditions increase young peoples’ ability to address and tackle problems. In keeping with other outcomes, the question remains whether the specific type of problem-solving experienced during an expedition can be transferred to more general challenges at home and in future life. Initial indications suggest that there are long-term benefits to such experiences in developing problem-solving skills and positive approaches to challenges (Allison, 1998, 2000, 2001, 2005, 2009; Institute of Public Policy Research, 2009) but longitudinal studies in this area may prove to be a fruitful area for further research. A further area of interest is how providers of expeditions may deliberately influence certain elements of the experience (e.g. length, equipment, location, facilitation style) in order to more deliberately elicit certain (presumably) desirable outcomes, such as increased self-confidence.

Such terms as social resilience, self-esteem and related psycho-sociological terms have received significant critique in recent years, indicating the contested nature of, not only the terminology, but also more importantly, the underlying conceptual understanding. For insightful synopses of these areas see Kristjansson (2007a, 2007b, 2009). It is our belief that those researching in these areas of outdoor and adventure education can make helpful progress by engaging with the psychological and philosophical literature on self-esteem and self-concept.

Outward personal growth (learning about others)

Several researchers have identified that participating in overseas youth expeditions appears to be associated with personal growth involving some kind of learning about other people. A cursory glance at a few expedition organisations web sites provides evidence to support this as the messages regarding personal growth are implicit throughout. According to Greenaway’s (1998) model, these qualities fall into the ‘outward’ (learning about others) category, and the sources of these claims are summarised in Table 3.

This is a complex set of related ideas that encompasses personal emotions (feelings about others) and practical social skills (behaviour towards others). To illustrate the difference between these two aspects of sociability, we can look at the ‘self-others’ reflection described by Allison (2000). He describes the ‘emotive’ difficulties involved in the post-expedition period, as relationships with old friends adjust (typically towards a positive conclusion) and new friendships with other expedition participants grow in significance (pp. 37–39). This is a different phenomenon from that identified by Beames (2005), where he noted the development of social

Table 3. Outward (learning about others) outcomes of overseas youth expeditions.

Outward (learning about others) (after Greenaway, 1998)
<i>Sociability</i>
Connectedness to others (Allison, 1998, 2000, 2005)
Sense of community (Andrews, 1999)
Interpersonal skills (Beames, 2003)
Interpersonal growth (Beames, 2004b)
Social adjustment (Bobilya et al., 2009)
Avoid loneliness (Stott & Hall, 2003)
Motivate others; lead through consultation with others (Stott & Hall, 2003)
Increased sociability and responsibility (Watts et al., 1993a, 1992, 1994)
Living with diverse group of people; learning centred around diverse community (Takano, 2010)
Extending the lessons of the group (Allison et al., 2011)

skills such as increased facility for cooperating with strangers and not prejudging others.

One surprising feature here is the very limited focus on leadership. Leadership skills are often promoted as one of the key learning outcomes in youth expeditions, but there is little evidence to suggest that this is something which young people learn. This may be indicative of some conceptual confusion regarding leadership development and personal development. Allison and Von Wald (2010) have been particularly critical of the 'leader for the day' approach, which is common on expeditions. They criticise this on the basis that it is an unrealistic and dated approach to leadership which is much more commonly a cooperative shared practice drawing on the range of skills within a group. Further conceptual difficulties involve confusion regarding, on the one hand, personal development which might involve a broad range of issues such as self-awareness, values exploration and narrative understanding. On the other hand, leadership development is a vague phrase involving a spectra of definitions but appears to be more specific than personal development. However, without a reasonably well developed level of self-awareness, leadership is destined for failure. This recognition of the importance of self-awareness in leadership is a point argued in, for example, recent neo-Aristotelian literature (e.g. O'Toole, 2005).

Inward personal growth (learning about self)

Several researchers have identified that participating in overseas youth expeditions appears to be associated with personal growth that involves some kind of learning about oneself. According to Greenaway's (1998) model, these qualities fall into the 'inward' (learning about self) category, and the sources of these claims are summarised in Table 4.

Whilst some of the outcome clusters encompass a broad set of related concepts, in this case we have a tight grouping of three research findings that relate very closely to each other. Watts et al. (1992) define emotional stability as being 'relatively free from worry and anxiety' (p. 338) and found the greatest improvement in this domain for those with highest initial scores (p. 341). Stott and Hall (2003) found that, amongst all changes in the social skills domain, the ability to 'control emotions' (p. 164) was the factor with the single greatest self-reported improvement.

Table 4. Inward (learning about self) outcomes of overseas youth expeditions.

Inward (learning about self) (after Greenaway, 1998)
<i>Emotional stability</i>
Personal-emotional adjustment (Bobilya et al. 2009)
Increased ability to control emotions (Stott & Hall, 2003)
Increased emotional stability (Watts et al., 1992)
<i>Reflection</i>
Reflection on values, self, life, career, friendships & relationships (Allison, 1998, 2000, 2005; Allison & Von Wald, 2010; Andrews, 1999)
Connectedness to self (Allison, 1998, 2000, 2005)
Greater understanding of themselves (Beames, 2005)
Personal reflection (Rea, 2006)
Enjoy isolation – avoid depression (Stott & Hall, 2003)
Spiritual development (Bobilya et al., 2009)
Learning from difficult experiences (Takano, 2010)
Sense of isolation (Allison et al., 2011; Greffrath et al., 2011)

Stott and Hall (2003) also noted that the expedition participants in question are ‘highly motivated, academically talented, have an adventurous spirit and are enthused to take on such a challenge’ (p. 161). Emotional stability is linked to two other major outcomes identified in the research: confidence and resilience. It is interesting that the greatest increases in emotional stability are likely to be seen in those young people who already display higher levels of confidence and resilience (Neill & Diaz, 2001). What becomes of those participants with lower initial scores remains unknown and is an area for further work. Undertaking such work could be timely given a recent increase in provision for expedition experiences for participants with such lower scores. This is one of three clusters of outcomes which are exceptionally well evidenced and widely acknowledged (the other two being increased sociability and increased confidence).

The research shows that both during (Rea, 2006; Stott & Hall, 2003) and after, an expedition (Allison, 1998, 2005; Allison, Davis-Berman, & Berman 2012), participants tended to increase their ability to reflect ‘inwardly’. That is to say, they were more able to think and talk about moral and metaphysical questions. What comes across strongly is participants’ ability to turn this critical lens inwards during moments of calm and physical stillness during the expedition:

When I stood on that peak, life suddenly felt real, I was in such awe of the landscape that I felt like sitting down and crying. I think a moment like that, you realise when and where in life you have gone wrong. (Voice of ‘Subject A’, Allison, 1998, p. 17)

Downward personal growth (learning about environment)

Several researchers have identified that participating in overseas youth expeditions appears to be associated with personal growth that involves some kind of learning about, understanding or appreciating the environment. According to Greenaway’s (1998) model, these qualities fall into the ‘downward’ (learning about environment) category, and the sources of these claims are summarised in Table 5.

There is a range of evidence to suggest that young people learn about the environment during a wilderness expedition. On one level, this is hardly surprising

Table 5. Downward (Learning about environment) outcomes of overseas youth expeditions.

Downward (Learning about environment) (after Greenaway, 1998)
<i>Environmental awareness</i>
Environmental appreciation (Allison, 1998, 2000, 2005)
Sense of place (Andrews, 1999)
Appreciation of modern conveniences (Beames, 2005)
Global awareness (Institute of Public Policy Research, 2009)

– indeed such a result would be expected after an extended period living in a beautiful wilderness setting. The research shows that various learning outcomes may be achieved. Firstly, there is ‘appreciation’ of the natural environment (Allison, 1998, 2000, 2005), understood as a relationship between self and environment akin to relationships between self and others. Andrews (1999) also understands young people’s experience of the environment as an extension of the ‘sense of community’ existing between participants.

Secondly, environmental awareness also develops in a political or social sense, whereby participants from developed countries become more aware of their comparatively privileged position in the world. In one study, 94% of expedition participants reported that their understanding of other cultures had increased as a result of their experiences (Sheldon, 2009, pp. 42–47). This is similar to the enhanced appreciation of modern conveniences found by Beames (2005). It is worth noting that both studies relate to Raleigh International, a provider with a particularly strong focus on community learning projects. These are, of course, axiomatic findings that confirm precisely what one would expect to be happening. Put another way, if young people were visiting developing countries and not reporting these understandings and appreciations one might reasonably ask ‘what are they learning?’ Similarly, the aims and skills of expedition leaders in taking young people away are likely to be critical (e.g. Tozer, Fazey, & Fazey, 2007). Thus, there is a need, not only to investigate what research has found, but to understand the context in which learning was framed on each expedition and/or programme.

In drawing this section to a close, it would be incomplete without having a brief critical look at Greenaway’s (1998) categories. The literature we have assembled has provided evidence that sometimes suggest alternate possibilities. For example, the first category of upward personal growth (realising potential) focuses on the measured or observed increases in confidence and resilience (sometimes deemed ‘character building’) of the young Brookes (2003a, 2003b) challenges the concept of character building, whilst Stonehouse, Allison and Carr (2011) defend it. Clearly, these kinds of debates cannot be settled in a paper such as this, but we feel that their existence should be highlighted here as it casts some questions over how well Greenaway’s (1998) adapted ‘four arrows’ personal growth model can account for every aspect of personal growth which young people might attain through expeditions.

Our literature search also provides evidence of the highly interrelated nature of the four categories of personal growth. For example, it would not be unreasonable to claim that whilst we have categorised increased self-confidence as upward personal growth, it could equally be valued as inward personal growth in the sense that, as well as being perceived by people on the outside, improved self-confidence

is also something which one feels inside. Likewise, emotional stability (classed by us as inward personal growth) is also linked to two other major outcomes identified in the research: confidence and resilience, which we assigned to the upward personal growth category. We feel these examples illustrate the challenges and difficulties of applying any relatively simple model, such as Greenaway's (1998) four arrows personal growth model, to human subjects. Nevertheless, these challenges and difficulties should not deter us from at least making these attempts to generalise from the specific research efforts which we have uncovered in our literature search and through our own research (13 of the papers found in the searches having been authored by ourselves).

Overseas youth expedition processes

The purpose of this section is not to specify a causal link between any one process and outcome. Certain causal relationships might seem to make intuitive sense (e.g. the process of physically demanding activity being linked to the outcome of increased resilience). Where causal links are identified or suggested by authors of individual studies, these are highlighted. In the absence of studies linking these processes to outcome, it is not our intention to speculate on a set formula for a 'successful' expedition. Rather, we hope to establish patterns of association that can help providers to implement successful expeditions. This may appear to be less ambitious but we believe more realistic given the individual nature of expedition experiences

Table 6. Valued processes identified in overseas youth expeditions.

Genuine independence

Allowed to make choices and mistakes (Allison & Von Wald, 2010)

Limitations of operating inside provider's safety net (Pike & Beames, 2007)

Participants' mixed views towards provider risk assessment (Sheldon, 2009)

Group isolation and self-sufficiency

Self-sufficient living arrangements (Beames, 2004a)

Heightened stress levels/lack of privacy (Potter, 1998)

Self-sufficiency in a challenging environment (Sheldon, 2009)

Time out of normal social structures (Andrews, 1999)

Group diversity (Beames, 2004b; Sheldon, 2009)

Group isolation (Beames, 2004b)

Sense of isolation (Allison et al., 2011; Greffrath et al., 2011)

Person-centred leadership

Design programme always with the individual in mind (Greenaway, 1997)

Adaptive leadership with learning in mind (Tozer et al., 2007)

Use a specific development model as the programme rationale (Greenaway, 1998)

Be cognizant of conflict sources & stressors (Potter, 1998)

Conscious address of group dynamics; conscious promotion of 'expedition behaviour' (Cashel, 1994)

Nurture an open environment for personal expression pre-trip (Potter, 1998)

Positive responses to stress

Promote cooperative interdependence (Cashel, 1994)

Use of avoidance/resignation strategies in dealing with stress predicts less positive personality change (Watts et al., 1993b)

Physically demanding activity

Physically demanding activity (Beames, 2004a)

Ability to maintain physical fitness (Stott & Hall, 2003)

Physical expedition demands lead to increase in resilience (Ewert & Yoshino, 2011)

and the benefits gained. Table 6 summarises the valued processes identified in overseas youth expeditions.

Genuine (or authentic) independence is regarded to be of paramount importance for expedition providers. The expedition must be conducted within a safety framework that is acceptable to all stakeholders, and the surest way to achieve this is to have experienced leaders making the decisions which concern safety, but developing decision-making qualities in the young people by allowing them to take increasing responsibility as an expedition progresses. There is a dominant educational argument against a didactic approach; to adopt it reduces opportunities for participants to experience genuine decision-making – that act in which the group's values are projected onto the world, and in which learning with genuine consequences takes place. The expedition as a learning opportunity may be undermined by setting up contrived or artificial 'scenarios' where the genuine consequences are somehow mitigated or controlled and the degree of authenticity is lowered which may impact on the potential for learning.

In terms of group isolation and self-sufficiency, the overarching theme is that the specific type of expedition activity is of little importance in itself. What matters most is that the expedition is self-sufficient and in a remote area. It is under these conditions that 'expedition behaviour' develops and that the personal and social development outcomes are more likely to be achieved. This process is one which the research does clearly link to a specific set of outcomes. The self-sufficiency indicates that the group is in a wild environment (removed from normal physical structures), whilst the physical isolation means that the group is removed from normal social structures. Although we cannot identify a causal link, we can claim that self-sufficiency and isolation are strongly associated with the learning outcomes detailed above.

Person-centred leadership includes a wide range of diverse leader behaviours. If the behaviours have one purpose in common, it is that expedition leaders prioritise the development of participants over other objectives. This applies at the planning, 'delivery' and post-expedition phases. This can be illustrated with the examples of an expedition that is purely focused on the physical outcome (e.g. reaching a particular destination) and a 'personal development' expedition in which the learning is the explicit purpose. A difficult compromise must be maintained; the expedition must be 'genuine' in order to engage the participants (see 'Genuine Independence'), whilst at the same time, the leaders (& all involved) must be acutely aware of developing an environment in which personal development is a valued and explicit goal for all involved (including leaders).

Processes concerned with responses to stress differ only slightly from the person-centred leadership style detailed above. However, two studies have highlighted the importance of promoting a particular response to the physical and social stressors experienced on expedition. Participants who adopt avoidance or resignation strategies tend to exhibit less positive personality change (Watts, Webster, Morley, & Cohen, 1993b). It follows that it is the responsibility of expedition leaders to promote those responses to stress, which are more likely to lead to personal development. Cashel (1994) identified cooperative interdependence ('the perception that one is linked with others in a way that one cannot succeed unless they do') as the most positive response, and this accords with outcomes such as increased sociability and ability to reflect.

Physically demanding activity is a relatively simple expedition process that may well be one of the most important. A self-sufficient and self-propelled expedition almost inevitably includes a good deal of physical hardship. All the expeditions studied comprised an element of physical difficulty, and two studies specifically highlighted that activity was an essential component (Beames, 2004a; Takano, 2010). Interestingly, both of these studies were on Raleigh International. This physical element is fundamental to the expedition experience, and we would assert that the physical challenge process is important for the outcomes of resilience, confidence and self-reliance.

Conclusion

The following outcomes were found to be associated with overseas youth expedition participation:

- Upward personal growth (realising potential): increased confidence; physical and social resilience; self-reliance and ability to overcome challenges.
- Outward personal growth (learning about others): improved social skills.
- Inward personal growth (learning about self): improved emotional stability; better able to reflect on events.
- Downward personal growth (learning about environment): increased environmental appreciation and awareness.

The processes that were valued in overseas expeditions and which, with some caution, may be linked with some of the aforementioned outcomes include: genuine independence; group isolation and self-sufficiency; person-centred leadership; positive responses to stress and physically demanding activity.

Any review such as this relies on (a) finding all the relevant published material that matched our criteria, and (b) our interpretation of the findings published. We are fairly confident that we found all of the relevant published material matching our criteria that were written in English, and which have been entered into public electronic databases. We did not come across any works published in languages other than English, although of course, we acknowledge that there is bound to be expedition research written in languages other than English. The 35 key papers included in the thematic analysis come from the UK (26), USA (4), Australia (3), Japan (1) and South Africa (1). In terms of our interpretation of the findings, the authors of this article have personally published 13 of the 35 papers, so we are confident in our interpretation of at least those 13 papers.

In terms of methodological approaches undertaken in these 35 papers, 15 (43%) used a qualitative or anthropological approach based on interviews, observations and/or documents such as letters or diaries written by expedition participants. A further 7 papers (20%) adopted a questionnaire approach with a follow-up quantitative or statistical analysis, and three papers (9%) adopted a mixed methods design, which used both the above approaches. Finally, eight papers (23%) were methodological or used critical analysis in their approach. It should also be borne in mind that in some cases more than one paper was published from the same expedition (e.g. Watts, Apps, & East, 1993a; Watts, Cohen, & Toplis, 1994; Watts et al., 1992, 1993b and Beames, 2003, 2004a, 2004b), and this clearly biases this simple analysis. We are

struck by the small number of expeditions and expedition organisations on which the empirical studies are based.

Whilst this exercise has, we believe, been useful in drawing out a range of personal growth outcomes and processes from published research associated with overseas youth expeditions since 1990, there remains a great deal of research still to do. We believe there are, at least, five main areas for further research to focus on.

First, whilst we acknowledge the difficulties of establishing causality in educational research, we believe some work on identifying the key practices that are attributed to positive outcomes from expeditions will be useful.

Second, further work on identifying the current provision, numbers of young people going on expeditions, for how long, breakdown by sex, geographical distribution (from which parts of the UK and to where), social class, ethnicity, age and associated factors will provide useful data which could inform further research directions and energy. Such research might use large scale survey techniques to gather data already held by expedition providers. In collating such information some trends may be identifiable which we suspect could be beneficial in informing the youth expedition sector.

Third, it will be interesting and meaningful to further explore the relation of theory to practice to policy. For example, in what ways might the knowledge contained in this paper inform and influence those planning expeditions?

Fourth, work on examining potential links to curriculum may prove to be valuable. Given the current changes in curriculum and associated initiatives in the UK (e.g. Curriculum for Excellence in Scotland) and the Learning Outside the Classroom Agenda (England and Wales), we believe work in this area could be interesting and timely.

Fifth, given that the majority of work, with the exception of Takano (2010), examines relatively short-term benefits from expeditionary experiences we believe that further valuable contributions could involve longitudinal studies focusing on the benefits attributed to expedition experiences after long periods of time (e.g. 20 years or more).

Acknowledgements

We wish to acknowledge funding from Liverpool John Moores University's Centre for Excellence in Teaching and Professional Learning which supported J. Felter as a research assistant to undertake the literature searches, Prof Carolin Kreber at Edinburgh University made useful comments on an earlier draft of the manuscript as did anonymous reviewers. The University of Edinburgh Research and Knowledge Exchange Office also supported this work.

Note

1. For a response to Brookes, see Stonehouse, Allison and Carr (2011).

Notes on contributors

Tim Stott is a professor of Physical Geography & Outdoor Education at Liverpool John Moores University. He has completed several expeditions with the British Exploring Society and is a cofounder of www.expeditionresearch.co.uk.

Pete Allison is a senior lecturer in the The Institute for Sport, Physical Education and Health Sciences at The Moray House School of Education, University of Edinburgh. He has

completed numerous expeditions with the British Exploring Society and is the founder of www.expeditionresearch.co.uk.

Johannes Felter was a research assistant in the Faculty of Education, Community and Leisure at Liverpool John Moores University at the time of the research.

Simon Beames is a lecturer in the Institute for Education, Teaching and Leadership in The Moray House School of Education, University of Edinburgh. He has conducted research with Raleigh Expeditions and on a range of topics in outdoor and environmental education.

References

- Allison, P. (1998). Greenland: More questions than answers. *Horizons*, 2, 16–20.
- Allison, P. (2000). *Research from the ground up: Post expedition adjustment*. Cumbria: Brathay Hall Trust.
- Allison, P. (2001). School trips and youth expeditions: Time for a united front? *Horizons*, 16, 15–17.
- Allison, P. (2005). Post-expedition adjustment: What empirical data suggest. In *National Conference on Outdoor Leadership*, Estes Park, CO.
- Allison, P. (2007). When I stop and think about it ... further research is not required. In I. Turkova, D. Bartunek, & A. Martin (Eds.), *Proceedings from third international mountain and outdoor sports conference Hrubá Skala* (pp. 78–91). Prague: International Young Nature Friends.
- Allison, P. (2009). Research and its sense: Researching for impact and practice informed research. In I. Turkova, & A. Martin (Eds.), *Proceedings from fourth international mountain and outdoor sports conference Hrubá Skala* (pp. 50–60). Prague: International Young Nature Friends.
- Allison, P., & Beames, S. (2010). Feature article: The changing geographies of overseas expeditions. *International Journal of Wilderness*, 16, 35–42.
- Allison, P., Davis-Berman, J., & Berman, D. (2012). Changes in latitude, changes in attitude: analysis of the effects of reverse culture shock – A study of students returning from youth expeditions. *Leisure Studies*, 31, 487–503.
- Allison, P., & Higgins, P. (2002). Ethical adventures: Can we justify overseas youth expeditions in the name of education? *Australian Journal of Outdoor Education*, 6, 22–26.
- Allison, P., & Pomeroy, E. (2000). How shall we ‘know?’ Epistemological concerns in research in experiential education. *Journal of Experiential Education*, 23, 91–97.
- Allison, P., Stott, T. A., Felter, J., & Beames, S. (2011). Overseas youth expeditions. In M. Berry & C. Hodgson (Eds.), *Adventure education* (pp. 187–205). Abingdon: Routledge.
- Allison, P., & Telford, J. (2005). Turbulent times: Outdoor education in Great Britain 1993–2003. *Australian Journal of Outdoor Education*, 9, 21–30.
- Allison, P., & Von Wald, K. (2010). Exploring values and personal and social development: Learning through expeditions. *Pastoral Care in Education*, 28, 219–233.
- Allison, P., & Wurdinger, S. (2005). Understanding the power, promise and peril of the experiential learning process. *Teacher Education and Practice*, 18, 386–399.
- Andrews, K. (1999). The wilderness expedition as a rite of passage: Meaning and process in experiential education. *Journal of Experiential Education*, 22, 35–43.
- Ashby, M. (1999). The educational role of expeditions. *Teaching Geography*, 24, 122–125.
- Beames, S. (2003). Overseas youth expeditions. In B. Humberstone, H. Brown, & K. Richards (Eds.), *Whose journeys?* (pp. 289–296). Penrith: Institute for Outdoor Learning.
- Beames, S. (2004a). Critical elements of an expedition experience. *Journal of Adventure Education & Outdoor Learning*, 4, 145–157.
- Beames, S. (2004b). Overseas youth expeditions: A rite of passage? *Australian Journal of Outdoor Education*, 8, 29–36.
- Beames, S. (2005). Expeditions and the social construction of the self. *Australian Journal of Outdoor Education*, 9, 14–22.
- Beames, S., & Stott, T. A. (2008). *Raleigh international pilot study report*. Report commissioned by Raleigh International. Edinburgh: University of Edinburgh/Liverpool John Moores University.

- Blumer, H. (1969). *Symbolic interactionism: Perspective and method*. Berkeley: University of California Press.
- Bobilya, A. J., Akey, L., & Mitchell, D., Jr. (2009). Outcomes of a spiritually focussed wilderness orientation programme. *Journal of Experiential Education*, 31, 440–443.
- Bonanno, G. A. (2004). Loss, trauma, and human resilience: Have we underestimated the human capacity to thrive after extremely aversive events? *American Psychologist*, 59, 20–28. doi:10.1037/0003-066X.59.1.20
- British Standards Institute (BSI). (2007). *BS 8848 A specification for the provision of visits, fieldwork, expeditions, and adventurous activities outside the UK*. London: British Standards Institute.
- Brookes, A. (2003a). A critique of Neo-Hahnian outdoor education theory. Part one: Challenges to the concept of “character building”. *Journal of Adventure Education and Outdoor Learning*, 3, 49–62.
- Brookes, A. (2003b). A critique of Neo-Hahnian outdoor education theory. Part two: The fundamental attribution error” in contemporary outdoor education. *Journal of Adventure Education & Outdoor Learning*, 3, 119–132.
- Brymer, E. (2002). Exploring expedition research methodology: a personal reflection. *Australian Journal of Outdoor Education*, 6(2), 44–57.
- Cashel, C. (1994). Group Dynamics: Implications for successful expeditions. *Wilderness and Environmental Medicine*, 5, 163–170.
- Cook, L. (1999). The 1944 Education Act and outdoor education: From policy to practice. *History of Education*, 28, 157–172.
- Cooley, C. H. (1962). *Social organization*. New York, NY: Schocken.
- Cooley, C. H. (1964). *Human nature and the social order*. New York, NY: Schocken.
- Csikszentmihalyi, M., & Csikszentmihalyi, I. S. (1990). Adventure and the flow experience. In J. C. Miles & S. Priest (Eds.), *Adventure education* (pp. 149–155). State College, PA: Venture.
- Davis–Berman, J., & Berman, D. (2002). Risk and anxiety in adventure programming. *Journal of Experiential Education*, 25, 305–310.
- Department for Education and Skills. (2006). *Manifesto for learning outside the classroom*. Retrieved from <http://www.lotc.org.uk>
- Ewert, A. (1989). *Outdoor adventure pursuits: Foundations, models, and theories*. Scottsdale, AZ: Publishing Horizons.
- Ewert, A., & Yoshino, A. (2011). The influence of short-term adventure-based experiences on levels of resilience. *Journal of Adventure Education and Outdoor Learning*, 11(1), 35–50.
- Expedition Advisory Centre/Royal Geographical Society [EAC/RGS] (1999). *Expedition and fieldwork safeguarding opportunities for young people*. London: RGS (with IBG).
- Freeman, M. (2011). From ‘character-training’ to ‘personal growth’: The early history of outward bound 1941–1965. *History of Education: Journal of the History of Education Society*, 40, 21–43.
- Geography Outdoors. (2012). Retrieved August 6, 2012, from <http://www.rgs.org/OurWork/Fieldwork+and+Expeditions/Fieldwork+Expeditions.htm>
- Giges, B., & Rosenfeld, E. (1976). Personal growth, encounter and self-awareness groups. In M. Rosenbaum & A. Snadowsky (Eds.), *The intensive group experience the Free press*. New York, NY: Collier Macmillan.
- Greenaway, R. (1998). In search of respectable adventure. *Horizons*, 14, 24–26.
- Greffrath, G., Meyer, C., Strydom, H., & Ellis, S. (2011). Centre-based and expedition-based (wilderness) adventure experiential learning regarding personal effectiveness: An explorative enquiry. *Leisure Studies*, 30, 345–364.
- Grey, T. (1984). The expedition experience. *Adventure Education*, March/April, 17–18.
- Hattie, J., Marsh, H. W., Neill, J. T., & Richards, G. E. (1997). Adventure education and outward Bound: Out-of-class experiences that make a lasting difference. *Review of Educational Research*, 67, 43–87.
- Hopkins, D., & Putnam, R. (1993). *Personal growth through adventure*. London: David Fulton.
- Howe, K. (2005). The question of education science: Experimentism versus experimentalism. *Educational Theory*, 55, 306–321.

- Hunt, J. (1990). *Ethical issues in experiential education*. Boulder, CO: Association for Experiential Education.
- Jones, A. (2004). *Review of gap year provision. Research report RR555*. London: Department for Education & Skills.
- Kennedy, A. (1992). *The expedition experience as a vehicle for change in the inner city*. Penrith: Adventure Education.
- Khalid, S. K., Kunz, R., Kleijnen, J., & Antes, G. (2003). Five steps to conducting a systematic review. *Journal of the Royal Society of Medicine*, 96, 118–121.
- Kristjansson, K. (2007a). Justified self-esteem. *Journal of Philosophy of Education*, 41, 247–261.
- Kristjansson, K. (2007b). Measuring self-respect. *Journal for the Theory of Social Behaviour*, 37, 225–242.
- Kristjansson, K. (2009). Putting emotion into the self: A response to the 2008 Journal of Moral Education Special Issue on moral functioning'. *Journal of Moral Education*, 38, 255–270.
- Learning & Teaching Scotland. (2010). *Curriculum for excellence through outdoor learning*. Retrieved from <http://www.ltscotland.org.uk/learningteachingandassessment/approaches/outdoorlearning/about/cfethroughoutdoorlearning.asp>
- Loynes, C. (1999a). Development training in the United Kingdom. In J. C. Miles & S. Priest (Eds.), *Adventure programming* (pp.45–51). State College, PA: Venture.
- Loynes, C. (1999b). *Once upon a time*. Paper presented at the National Outdoor Education Conference, Perth, Australia.
- Mead, G. H. (1934). *Mind, self, and society: From the standpoint of a social behaviorist*. London: University of Chicago Press.
- Miles, J., & Priest, S. (1999). *Adventure programming*. State College, PA: Venture Publishing.
- Neill, J. T., & Dias, K. L. (2001). Adventure education and resilience: The double-edged sword. *Journal of Adventure Education and Outdoor Learning*, 1, 35–42.
- Nicol, R. (2002). Outdoor education: Research topic or universal value? Part one. *Journal of Adventure Education and Outdoor Learning*, 2, 29–41.
- O'Toole, J. (2005). *Creating the good life*. London: Rodale.
- Palethorpe, R., & Wilson, J. P. (2011). Learning in the panic zone: Strategies for managing learner anxiety. *Journal of European Industrial Training*, 35, 420–438. doi:10.1108/03090591111138008
- Pike, E., & Beames, S. (2007). A critical interactionist analysis of 'Youth Development' expeditions. *Leisure Studies*, 26, 147–159.
- Potter, T. G. (1998). *Human dimensions of expeditions: Deeply rooted, branching out*. Paper presented at the 1997 AEE International Conference. Asheville, USA.
- Priest, S. (1990). The adventure experience paradigm. In J. C. Miles & S. Priest (Eds.), *Adventure education* (pp. 157–162). State College, PA: Venture.
- Priest, S., & Gass, M. (1997). *Effective leadership in adventure programming* (2nd ed.). Leeds: Human Kinetics.
- Raleigh International. (2011). *About Raleigh*. Retrieved January 3, 2011, from <http://www.raleighinternational.org/>
- Rea, T. (2006). 'It's not as if we've been teaching them'. Reflective thinking in the outdoor classroom. *Journal of Adventure Education and Outdoor Learning*, 6, 121–134.
- Rickinson, M., Dillon, J., Teamey, K., Morris, M., Choi, M. Y., Sanders, D., & Benefield, P. (2004). *A review of research on outdoor learning*. Shrewsbury: National Foundation for Educational Research and King's College London.
- Rowe, M. (2008). The credibility gap. *Geographical August*, 46–53.
- Sayer, A. (2011). *Why things matter to people?* Cambridge: Cambridge University Press.
- Sheldon, R. (2009). *Rallying together: A research study of Raleigh's work with disadvantaged young people*. London: Institute for Public Policy Research.
- Smith, M. (2008). *Exploring a changing world: A guide to fieldwork for youth expeditions*. London: Young Explorers Trust.
- Stonehouse, P., Allison, P., & Carr, D. (2011). Aristotle, Plato, and Socrates: Ancient Greek perspectives on experiential learning. In T. E. Smith & C. E. Knapp (Eds.), *Sourcebook of experiential education: Key thinkers and their contributions* (pp. 18–25). London: Routledge.

- Stott, T. A., & Hall, N. E. (2003). Changes in aspects of students' self-reported personal, social and technical skills during a six-week wilderness expedition in Arctic Greenland. *Journal of Adventure Education and Outdoor Learning*, 3, 159–169.
- Takano, T. (2010). A 20-year retrospective study of the impact of expeditions on Japanese participants. *Journal of Adventure Education and Outdoor Learning*, 10, 77–94.
- Thomas, G., Potter, T., & Allison, P. (2009). A tale of three journals: An investigation of the development and futures of AJOE, JAEOL and JEE. *Australian Journal of Outdoor Education*, 13, 16–29.
- Tozer, M., Fazey, I., & Fazey, J. (2007). Recognizing and developing adaptive expertise within outdoor and expedition leaders. *Journal of Adventure Education and Outdoor Learning*, 7, 55–75.
- Watts, F. N., Apps, J., & East, M. P. (1993a). Personality change produced by expedition stress: A controlled study. *Personality and Individual Differences*, 15, 603–605.
- Watts, F. N., Cohen, J., & Toplis, R. (1994). Personality and coping strategies on a stressful expedition. *Personality and Individual Differences*, 17, 647–656.
- Watts, F. N., Webster, S. M., Morley, C. J., & Cohen, J. (1992). Expedition stress and personality change. *British Journal of Psychology*, 83, 337–341.
- Watts, F. N., Webster, S. N., Morley, C. J., & Cohen, J. (1993b). Cognitive strategies in coping with expedition stress. *European Journal of Personality*, 7, 255–266.
- Williams, R., Higgins, P., Humberstone, B., & Loynes, C. (1998). *Outdoor education in Britain, in: Outdoor, adventure and experiential learning: A wealth of European concepts. Report of the third European congress of the European institute for outdoor adventure education and experiential learning*. Marburg: European Institute for Outdoor Adventure Education.
- Winsler, S. (2004). *Royal Geographical Society Expedition Handbook*. London: Profile Books.